

The Honorable Commissioner of Patents
and Trademarks

Page 2

AMENDMENTS TO THE FIGURES

Please replace Figures 3 and 4 with presently on file with the corresponding new Figures, enclosed herewith.

AMENDMENTS TO THE SPECIFICATOIN

Please replace the paragraph beginning on page 4, line 21 and ending on page 5, line 3 with the following paragraph:

As mentioned above, the major drawback of traditional CPE-VPNs is their inability to accelerate a secure tunnel transmission over the wireless network. The reason the CPE-VPNs cannot accelerate such secure tunnel transmissions is because the aforementioned optimization performance techniques operate on the transport layer and up (fourth layer) of the OSI standard, whereas the encryption occurs on the network layer (third layer). That is to say, the signal cannot be accelerated as it bypasses the acceleration server [120] in a lower layer encrypted tunnel.

Please replace the paragraph beginning on page 5, line 16, and ending on page 6, line 11 with the following paragraph:

One aspect of the invention is defined as a method for securely accelerating customer premises equipment based virtual private network transmissions over a wireless network comprising the steps of: establishing an encrypted acceleration tunnel between a VPN acceleration client and a VPN acceleration server in response to a VPN acceleration client request for information wherein the encrypted acceleration tunnel terminates at a VPN acceleration server; securely transmitting the relevant VPN address and required data information to the VPN acceleration server over the encrypted acceleration tunnel; establishing an encrypted VPN tunnel between the VPN acceleration server and an appropriate enterprise content server via a VPN switch, wherein the appropriate enterprise content server corresponds with the required data information transmitted; encrypting and transmitting required data corresponding to the required data information ~~from~~ from the VPN switch to the VPN acceleration server over the VPN tunnel, wherein the required data is communicated from the appropriate enterprise content server to the VPN switch prior to encryption and transmission; decrypting the required data at the VPN acceleration server; accelerating, encrypting and transmitting the required data to the VPN acceleration client; and decrypting and decelerating the required data in response to the VPN acceleration client receiving the required data.

The Honorable Commissioner of Patents
and Trademarks

Page 3

Please replace the paragraph beginning on page 7, line 17 and ending on page 8, line 2 with the following paragraph:

Referring to enterprise network [104] one can see a VPN switch [112] interconnected to a plurality of Enterprise content servers [110]. A VPN switch [112] is a server on the enterprise network [104] that communicates with enterprise content servers [110] and a VPN acceleration server [160] on the wireless network [408]-[108¹] for purposes of establishing a secure communication channel therebetween. As will be apparent to one skilled in the art the content servers [110] store the various enterprise related data to be communicated over the CPE-VPN [100].

Please replace the paragraph beginning on page 11, line 14 and ending on page 11, line 22 with the following paragraph:

From a Wireless Service Providers perspective, the aforementioned methodology is beneficial for the following reasons. First, the added feature of secure wireless connections with an enterprise network is a value-added offering to end-user corporate customers. Second, wireless providers do not need to sell acceleration servers to enterprise companies and instead can focus on selling wireless devices and services to ~~end-users~~ end-users, their traditionally preferred sales channel. Finally, as a result of an enterprise not requiring its own accelerator server to optimize the signal before transmission over a VPN tunnel, a Wireless service provider can provide this service at a reduced cost.